

I claim:

1. A method for an inertial oscillator control system
comprising

A. a near vertical lifting system for heavy gravity
payloads in a first embodiment:

- a) utilizing the compound action of coriolis-centrifugal forces in a three body variable radius oscillator ,
- b) torque supply source comprising sliding gear arrangement
- c) moveable platform that carries force generating bodies rotating about respective axles,
- d) coupling and release of platform with rigid load rod connected to frame for angular durations less than 90 degrees of planet rotor,
- e) while maintaining constant angular velocity of of rotor bodies by a regulation system,
- f) maintaining an elevation position of platform in gravity field using spring-crank mechanism, and
- g) vectoring platform-frame off from vertical to obtain horizontal motion of payload,
- h) and a motor drive source of high torque design.

B, a near vertical lift system for gravity payload in a second embodiment,

- a) a rotary torque source using an oldham Coupler,
- b) driving a two body oscillator consisting of a ~~up~~plat form with single rotor,
- c) in a coaxial arrangement of multiple oscillators with each rotor, ^{PA}clocked 180 degrees apart from each other,
- d) that co-rotate in one direction to provide a net gyroscopic moment to stabilize vehicle once in the air,
- e) a heavy duty clutching system using a cam buckle acting on nylon webbing in tension connection with the frame,
- f) a speed regulation design using a mechanical governor
- g) and a motor source with high torque.

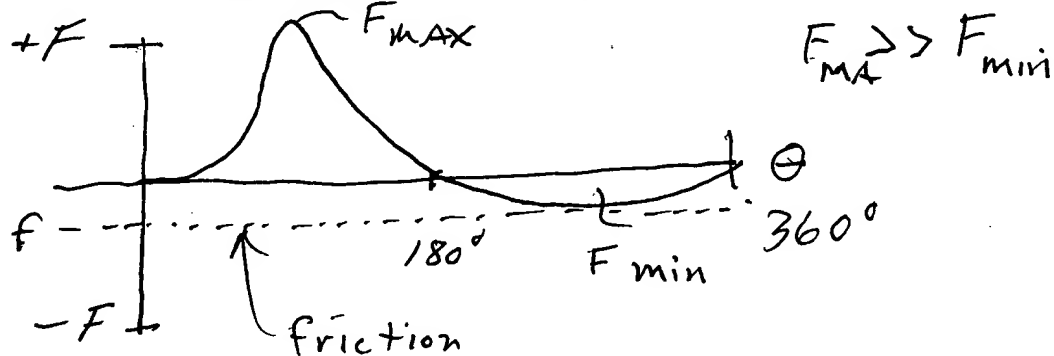
but otherwise having the same controls as the 1st embodiment.

2. A system as in claim 1 where the mechanical clutch is a toggle clamp acting on a grooved load rod with backup plate and activate by rotary cam engaging a follower on toggle arm and release from a second rotating pin on separate axis.

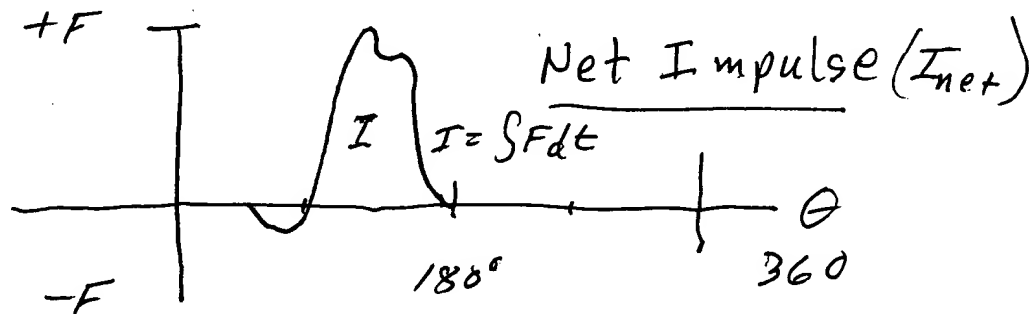
3, A system as in claim 1 with a mechanical clutch using a cam buckle acting on a nylon webbing in tension with the frame.

4. A system as in claim 1A, where the rotor mass is a satellite mass fixed to a planet gear via arm which revolves around a fixed sun gear via axle connected to gear drive
5. A system as in claim 1A where the distances between the respective masses are equal.
6. A system and in claim 1A where the satellite mass is zero and the just the planet rotor revolves bout the sun gear axle.
7. A system as in claim 1A where the platform mass is equal to twice the mass sum of the planet and satellite rotors.
8. A system as in claim 1A where the motor is an AC induction motor.
9. A system as in claim 1A where the motor is a DC electric motor.
10. A system as in claim 1B where the motor is a rotary wankel engine.
11. A system as in claim 1A where the drive is a splined shaft with slidable worm acting on worm gears to drive rotors.
12. A system as in claim 1A where at least two oscillator units are paired in a frame to provide zero transverse forces and multiple pulse of thrust per rotation.
13. A system as in claim 1 where the frame is mounted above the payload in gimbal fashion to permit vectoring for horizontal thrust.
14. A system as in claim 2B where the drive is a pair of chain sprockets clocked in synchronous operation with the motor and crank spring reset system and rotor main drive axle.

The models have been instrumented with force transducers to measure the action-reaction impulses. This is shown in the attached photographs. Prior-art devices are NET FORCE GENERATORS, not NET IMPULSE GENERATORS, AS ILLUSTRATED BELOW:



Thus, in a NFG device, motion is achieved by a sharp spike of force followed by a soft force that's less than the friction in the system. The spike creates the appearance of thrust since it can overcome the friction of the device on the surface. My device generates a true net impulse as shown below:



I submit that all prior art are non-operative devices that fail to comprehend the correct physics.

CONCLUSION:

For the above reasons, the applicant submit that the specification and claims are now in proper form and that the claims all define patentably over the prior art. Therefore, they submit that this application is in condition for allowance.